

Zeiss LSM880 Airyscan Fast (Anatomy & Neuroscience) INSTRUMENT SPECIFICATION SHEET



BIOLOGICAL
OPTICAL
MICROSCOPY
PLATFORM

Location	N814, 8 th Floor, Medical Building					
Stand	AxioImager Z2 (Upright microscope)					
Illumination	Transmitted			Fluorescence		
	Halogen 100W			HXP120V		
Eyepiece filters	Name	Excitation	Dichroic	Emission		
	DAPI	G365	FT395	BP445/50	488049-9901-000	
	GFP	BP470/40	FT495	BP525/50	000000-1031-346	
	Cy 3	BP545/25	FT570	BP605/70	000000-1114-101	
Lasers	Type		Wavelength			Maximum output
	Diode		405 nm			30 mW
	Argon		458, 488, 514 nm			25 mW
	DPSS		561 nm			20 mW
	HeNe		594 nm			2 mW
	HeNe		633 nm			5 mW
Stage control	Motorised stage with Z piezo, capable of tile scan, multi-point and z stack					
Objectives Specification	Magnification	Type	NA	Working distance	Coverslip Thickness	Resolution at 550nm (Glycerol mounted)
Fluar (420130-9900-000)	5x	Air	0.25	12.5 mm	0.17 mm (#1.5)	Lateral 880, Axial 2095
Plan-Apochromat (420640-9900-000)	10x	Air	0.45	2.1 mm	0.17 mm (#1.5)	Lateral 489, Axial 1164
Plan-Apochromat (420650-9901-000)	20x	Air	0.8	0.55 mm	0.17 mm (#1.5)	Lateral 275, Axial 655
Plan-Apochromat (420762-9800-799)	40x	Oil	1.3	0.2 mm	0.17 mm (#1.5)	Lateral 169, Axial 403
W Plan-Apochromat 421462-9900-799	40x	Water	1.0	2.5 mm	0 (no coverslip)	Lateral 220, Axial 577
Plan-Apochromat (420782-9900-799)	63x	Oil	1.4	0.19 mm	0.17 mm (#1.5)	Lateral 157, Axial 374
Detectors	#	Type	Details			
	2	MA PMT	Standard fluorescence detectors (Multi Alkali PMT)			
	1	QUASAR	32 GaAsP PMT array for spectral detection			
	1	Airyscan	32 GaAsP PMT array for super-resolution, virtual pinhole, airyscan fast			
	1	T-PMT	Transmitted light detector			
Airyscan filters & fluorophores applications (not limited to)	BP420-480 + BP495-550			DAPI, GFP		
	BP420-480 + BP495-620			DAPI, GFP, RFP		
	BP420-480 + LP605			DAPI, Texas Red, CY5		
	BP465-505 + LP525			CFP, YFP		
	BP495-550 + LP570			GFP, RFP		
	BP570-620 + LP645			RFP, CY5		
Software	Zen 2.3					
Holder	Slide holder					
Applications	Fixed Tissue, Fixed cells, super-resolution, fast super-resolution, spectral separation					
File Saving	\\unimelb.edu.au\MDHS-Research\Platforms\BOMP\Data-mirror\LSM880					
Extra features						